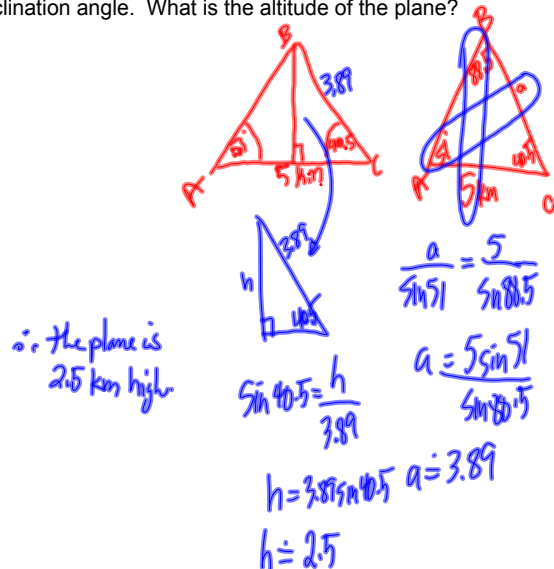


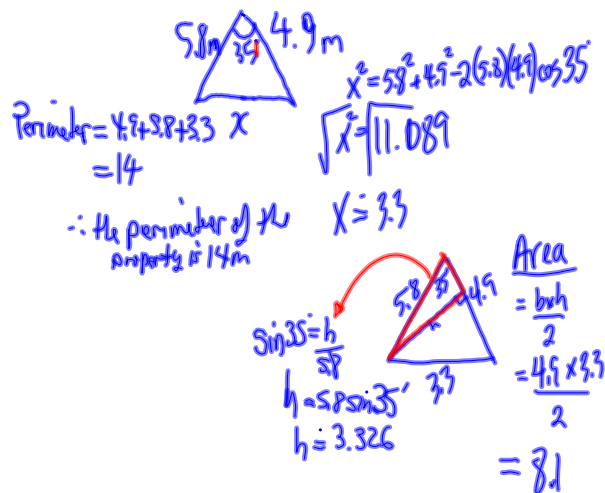
5.10 Applications of Trigonometry

Ex.1. Two observers who are 5 km apart. At the same time, they see a small airplane flying above and between them. One observer measures a 51° angle of inclination (elevation), while the other measures a 40.5° inclination angle. What is the altitude of the plane?



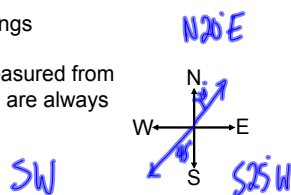
Ex.2

Shannon works for a landscaping business. Her job is to measure properties. For a triangular piece of land, two sides measure 4.9 m and 5.8 m and meet at a common point separated by a 35° angle. Find the total perimeter of the piece of land.

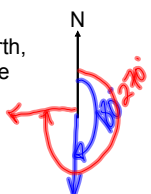


Compass Directions & Bearings

- (a) A compass direction is measured from N, S, E, or W. The angles are always between 0° and 90° .



- (b) A bearing is always measured from north, in a clockwise direction. The values are from 000 to 360 (but less than 360).



Compass Direction	Bearing	Path
N10°E	010	
N40°W	320	
SW	225	

-/

Assigned Work:

p.450 # 4 (see Ex.2 p.447), 9 (see Ex.1 p.446)
p.450 # 5, 8, 11, 13, 15

Extra Word Problems - Handout

Next class is a review period.

Review Questions:

p.416 #2, 3, 5, 6, 9, 13, 14, 16
p.453 #2, 3, 7, 8, 11, 12